

SUMMARY OF THE NATIONAL DATABASE COMMITTEE TELECONFERENCE OCTOBER 14, 1998

The National Database Committee of the National Environmental Laboratory Accreditation Conference (NELAC) met by teleconference on Wednesday, October 14, 1998, at 2:30 p.m. Eastern Daylight Time (EDT). The meeting was led by its chair, Mr. Matthew Caruso of the State of New York Department of Health. A list of action items is given in Attachment A. A list of participants is given in Attachment B. *The purpose of the meeting was to go over the requirements analysis document and discuss the next steps for the National Database Committee.*

REQUIREMENTS ANALYSIS

The committee discussed the document *Requirements Analysis for NELAP National Database (Revised Draft)*, August 31, 1998 prepared by Technology Planning and Management Corporation (TPMC). Ms. Jo Ann Kerrick of TPMC, who participated in the teleconference, had previously distributed the document to the National Database Committee participants for review. Discussion about this document, organized by document sections, is summarized below.

Section 3 Enterprise Model

Section 3.2.1, Accrediting Authority. The comment was made that the meaning of the second paragraph is not clear. This paragraph was intended to explain the proposed information model that would eliminate the need to enumerate all matrix-method-analyte combinations for an accrediting authorities area of recognition. The paragraph will be reworded to clarify the explanation.

Section 3.2.1, Accrediting Authority. The last sentence of the third paragraph states “Primary AAs [accrediting authorities] are responsible for notifying secondary AAs about changes the accrediting status of a laboratory.” The question was raised as to whether notification of secondary AAs is a requirement in the National Environmental Laboratory Accreditation Program (NELAP) standard. Chapter 6 of the standard has a requirement for the primary authority to provide updates to the NELAP National Database (NND), but nothing about notifying secondary authorities. The ND Committee had agreed that the NND should serve as a mechanism for notifying secondary authorities and this concept should be reflected in the NELAC Standards.

Section 3.3.6, Maintaining Reciprocity Agreement. This section of the requirements analysis recommends the following schedule for updating the NND regarding changes in accreditation status of a laboratory:

- Daily from AAs that have an automated program management system
- Weekly from AAs that are posting interactively

The committee felt this schedule is reasonable for automated and interactive updating. However, it was suggested that the term of “automatic program management system” should be clarified to

convey the meaning that an operator is not required to initiate the update process (e.g., an automated email system or automated batch processing that occurs even when the system is unattended). In addition, a request will be made to the NELAP Chapter 6 Committee to make this updating schedule a requirement in the standard for accrediting authorities.

The comment was made that a standardized data reporting format of updates to the NND should be specified.

Section 5 Data Model

The question was raised as to whether fields can be added to the database after it has been developed in case the committee would like to add additional attributes at a later date. Adding fields is generally not a problem using current relational database software.

The question was raised as to whether the rate at which the NND will be accessed had been estimated and if the proposed computer system can handle this volume of activity. Estimates of “hit-rate” have not been made and would probably be difficult to do. In general, access to the NND will be for updates and a variety of information queries. In addition, the volume of activity will fluctuate. For example, the volume of activity will be high following proficiency testing (PT). The current plan is that the database will reside on an external U.S. Environmental Protection Agency (EPA) server. The comment was made that the requirements analysis document should be shared with EPA’s computing center in Research Triangle Park, NC.

The comment was made that the format of data reported from proficiency testing (PT) providers could be standardized so that PT data files, which are sent to accrediting authorities, could be forwarded to the NND without modification. EPA also maintains a database containing PT data. It may be possible for these two databases to share data.

The comment was made that laboratory identification numbers may differ between PT providers and accrediting authorities and that accrediting authorities may have to translate identification numbers. Also, after receiving PT data, accreditation authorities have to decide if criteria have been met to change accreditation status, which also entails looking at data on past performance of the laboratory.

Section 7 Environment and Support

Section 7.3, Data Administration. The requirements analysis document states that “Currently, there are no requirements or criteria for data archival.” The comment was made that data archival could be an issue during a lawsuit if specific events need to be reconstructed from historical data. It was pointed out that the NND is not designed to track events but will contain information about the current status of laboratories. Maintaining historical data to serve as an audit trail is the responsibility of the accrediting authorities. Data archiving, removing data from the active database for long-term storage, is a different activity than performing regular back-ups of data.

A question was raised about the procedures for deleting a laboratory from the NND. In general, deletion is a two-step process. First, the record is flagged, then, at a later time, flagged records

would be deleted. The details of this procedure have not been decided yet. Disk space and system performance are also factors in determining how this will be done.

Section 8. Next Steps

Section 8.2.4 Performance Based Measurement Systems (PBMS). As stated in the requirements analysis, the impacts of PBMS on the development of the database need to be identified. For example, PBMS does not specify a standard test method name. Consequently, how should an analytical method be identified in the NND? One suggestion was that a description file could be used to allow for a text description of the PBMS-based method. The larger issue of implementing PBMS is beyond the scope of the ND Committee. However, as implementation of PBMS progresses, its impacts on the NND need to be assessed.

NEXT STEPS FOR THE NATIONAL DATABASE COMMITTEE

Continued development of the NND depends on receiving additional EPA funding. EPA had included development of the NND in its budget request. However, details of funding for EPA are not yet available. Dr. Stemmler will follow-up on this item and notify the committee when news about funding is available.

There is no need to reconvene the ND Committee until additional funding is available and the products of the next phase of the NND are available for review. The comment was made that development of a prototype database would probably take at least 6 months.

**ACTION ITEMS
NATIONAL DATABASE COMMITTEE
OCTOBER 14, 1998**

Item No.	Action Item	Date to be Completed
1.	RTI to complete the draft minutes for the teleconference.	October 15, 1998
2.	This ND Committee needs a list of NELAC analytes by program and method along with clarification of how analytical methods will be identified under a PBMS-based system.	
3.	Ms. Kerrick will make revisions to the requirements analysis document discussed during the teleconference as directed by Dr. Stemmler.	
4.	Share the requirements analysis document with EPA's computing center in Research Triangle Park, NC.	
5.	Request that the NELAP Chapter 6 Committee make the NND updating schedule specified in Section 3.3.6 of the requirements analysis document a requirement for accrediting authorities.	
6.	Dr. Stemmler to inform the ND Committee on the status of EPA funding NND development	As funding information is available.

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NATIONAL DATABASE COMMITTEE
OCTOBER 14, 1998**

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